

AMENDMENTS TO THE CLAIMS

1. (Canceled)
2. (Currently Amended) The fluorocarbon emulsion according to claim [[25]] 24, ~~further~~ comprising 2 – 40% by vol. of the plurality of perfluorocarbon compounds.
3. (Currently Amended) The fluorocarbon emulsion according to claim [[25]] 24, wherein a composition of rapidly eliminated perfluorocarbon compounds contains perfluorodecaline and perfluorooctylbromide in a ratio between 10 : 1 and 1 : 10.
4. (Currently Amended) The fluorocarbon emulsion according to claim [[25]] 24, wherein the perfluorocarbon supplement contains 1 to 50% of a total content of a composition of rapidly eliminated perfluorocarbon compounds.
5. (Currently Amended) The fluorocarbon emulsion according to claim [[25]] 27, wherein the ~~mixture of perfluorinated tertiary amines~~ contains a mixture of perfluorotripropylamine and coproducts thereof, including

Serial No.: 10/591,411

comprises cis- und trans-isomers of perfluoro-1-propyl-3,4-dimethylpyrrolidone and perfluoro-1-propyl-4-methylpiperidine.

6. (Previously Presented) The fluorocarbon emulsion according to claim 5, wherein the mixture of perfluorinated tertiary amines contains in addition perfluoro-N-methylcyclohexylpiperidine and coproducts thereof.

7. (Previously Presented) The fluorocarbon emulsion according to claim 24, further comprising the phospholipid dispersion in the water-salt medium in a concentration of 0.2 to 5% by weight.

8. (Previously Presented) The fluorocarbon emulsion according to claim 24, wherein the phospholipid dispersion in the water-salt medium contains one of egg phospholipids, soya phospholipids, phospholipids or a mixture thereof.

9. (Previously Presented) The fluorocarbon emulsion according to claim 24, wherein the phospholipid dispersion in the water-salt medium contains as adjuvant vegetable oil in a quantity of 1 - 15% of the total content of the phospholipids.

Serial No.: 10/591,411

10. (Previously Presented) The fluorocarbon emulsion according to claim 9, wherein soya oil serves as adjuvant.

11. (Previously Presented) The fluorocarbon emulsion according to claim 9, wherein sunflower seed oil serves as adjuvant.

12. (Previously Presented) The fluorocarbon emulsion according to claim 9, wherein ricinus oil serves as adjuvant.

13. (Previously Presented) The fluorocarbon emulsion according to claim 9, wherein a mixture of the oils in an effective ratio in a form of one of a twofold mixture and a threefold mixture serves as adjuvant.

14. (Previously Presented) The fluorocarbon emulsion according to claim 24, wherein the composition of the water-salt medium contains sodium salts and potassium salts of chlorides and phosphates and the monosaccharide mannitol in injection water.

15. (Previously Presented) The fluorocarbon emulsion according to claim 24, wherein a concentration of components in the water-salt medium has an osmotic pressure in the range of 100 - 350 mosmol/l.

Serial No.: 10/591,411

16. (Previously Presented) The fluorocarbon emulsion according to claim 15, wherein a mean particle size is equal to or less than 0.2 μm and is in a range of 0.06 – 0.2 μm .

17. (Withdrawn – Currently Amended) A method for producing a fluorocarbon emulsion according to Claim 24, the method comprising:
a first step of producing a phospholipid dispersion in a water-salt medium, a second step of homogenization of the perfluorocarbon compounds in the phospholipid dispersion, a third step of heat sterilization of the produced emulsion, and a fourth step of subsequent storage of at least 6 months in a non-frozen state at a temperature of +4°C.

18. (Withdrawn) The method according to claim 17, wherein the phospholipid dispersion in the water-salt medium is produced by homogenization at a high pressure of at least 100 atm with subsequent heat sterilization.

Claims 19-21. (Canceled)

22. (Currently Amended) The fluorocarbon emulsion according to claim ~~[[25]]~~ 24, wherein the mixture of perfluorinated tertiary amines

Serial No.: 10/591,411

contains in addition perfluoro-N-methylcyclohexylpiperidine and coproducts thereof.

23. (Currently Amended) The fluorocarbon emulsion according to claim 24, wherein a mean particle size is equal to or less than 0.2 μm and is in a range of 0.06 – 0.2 μm .

24. (Currently Amended) A fluorocarbon emulsion for medicinal purposes, comprising:

a water-salt medium;

a phospholipid ~~emulsifier-dispersed~~ dispersion in the water-salt medium; and

a plurality of perfluorocarbon compounds homogenized with the phospholipid dispersion, the plurality of perfluorocarbon compounds including a composition of perfluorodecaline and perfluorooctylbromide used as a rapidly eliminated component and a perfluorocarbon supplement including a mixture of perfluorinated tertiary amines.

25. (Canceled)

Serial No.: 10/591,411

26. (New) The fluorocarbon emulsion according to claim 24, wherein the emulsion has a mean particle size in a range of 0.06 – 0.2 μm upon storage of at least six months in a non-frozen state at a temperature of +4°C .

27. (New) The fluorocarbon emulsion according to claim 24, wherein the mixture of perfluorinated tertiary amines contains a mixture of perfluorotripropylamine and coproducts thereof.

28. (New) The fluorocarbon emulsion according to claim 27, wherein the mixture of perfluorinated tertiary amines further comprises perfluoro-N-methylcyclohexylpiperidine and coproducts thereof.